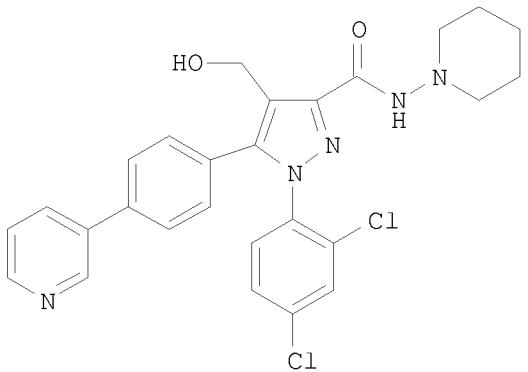
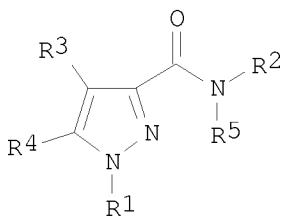


L35 ANSWER 31 OF 39 CAPLUS COPYRIGHT 2009 ACS on STN
 ACCESSION NUMBER: 2003:202423 CAPLUS <<LOGINID::20090108>>
 DOCUMENT NUMBER: 138:238177
 TITLE: Preparation of 1H-pyrazole-3-carboxamides as cannabinoid receptor stimulators
 INVENTOR(S): Makriyannis, Alexandros; Liu, Qian
 PATENT ASSIGNEE(S): University of Connecticut, USA
 SOURCE: PCT Int. Appl., 73 pp.
 CODEN: PIXXD2
 DOCUMENT TYPE: Patent
 LANGUAGE: English
 FAMILY ACC. NUM. COUNT: 4
 PATENT INFORMATION:

PATENT NO.	KIND	DATE	APPLICATION NO.	DATE
WO 2003020217	A2	20030313	WO 2002-US27644	20020829
WO 2003020217	A3	20030821		
W: AE, AL, AM, AT, AU, AZ, BA, BB, BG, BR, BY, CA, CH, CN, CR, CU, CZ, DE, DK, DM, EE, ES, FI, GB, GD, GE, GH, GM, HR, HU, ID, IL, IN, IS, JP, KE, KG, KP, KR, KZ, LC, LK, LR, LS, LT, LU, LV, MA, MD, MG, MK, MN, MW, MX, NO, NZ, PL, PT, RO, RU, SD, SE, SG, SI, SK, SL, TJ, TM, TR, TT, TZ, UA, UG, US, UZ, VN, YU, ZA, ZW				
RW: GH, GM, KE, LS, MW, MZ, SD, SL, SZ, TZ, UG, ZM, ZW, AM, AZ, BY, KG, KZ, MD, RU, TJ, TM, AT, BE, BG, CH, CY, CZ, DE, DK, EE, ES, FI, FR, GB, GR, IE, IT, LU, MC, NL, PT, SE, SK, TR, BF, BJ, CF, CG, CI, CM, GA, GN, GQ, GW, ML, MR, NE, SN, TD, TG				
CA 2457922	A1	20030313	CA 2002-2457922	20020829
AU 2002331766	A1	20030318	AU 2002-331766	20020829
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R: AT, BE, CH, DE, DK, ES, FR, GB, GR, IT, LI, LU, NL, SE, MC, PT, IE, SI, LT, LV, FI, RO, MK, CY, AL, TR, BG, CZ, EE, SK				
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US 20040192667	A1	20040930	US 2004-790498	20040301
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PRIORITY APPLN. INFO.:			US 2001-316515P	P 20010831
			US 1999-159993P	P 19991018
			WO 2000-US41239	W 20001018
			WO 2002-US27644	W 20020829
			US 2002-110865	A2 20021021
			US 2004-790498	A2 20040301

OTHER SOURCE(S): MARPAT 138:238177
 GI



AB Title cannabimimetic pyrazole analogs I [wherein R1 = $(CH_2)_nZ$; or R1 = carbocyclic, heterocyclic, or (hetero)aromatic ring fused to a heterocyclic or heteroarom. ring; n = 0-7; Z and R3 = H, halo, N3, NCS, CN, NO2, NX1X2, OX3, OAc, acyloxy, aroyloxy, $O(CH_2)_nOH$, $O(CH_2)_nNX_1X_2$, acylamino, aroylamino, CHO, CF3, CO2X3, SO3H, SO2NX1X2, CONX1X2, alkoxy, alkylmercapto, or (di)alkylamino; or Z = (un)substituted carbocyclyl, heterocyclyl, (hetero)aryl, (hetero)bicycyl, or (hetero)tricycyl; X1 and X2 = independently H or alkyl; or NX1X2 = heterocyclyl or imide ring; X3 = H, (hydroxy)alkyl, or alkyl-NX1X2; n = 0-6; R2 = (un)substituted carbocyclyl, heterocyclyl, or (hetero)aryl; or R2 = carbocyclic, heterocyclic, or (hetero)aromatic ring fused to a heterocyclic or heteroarom. ring; or R3 = Ph, alkyl, OH, alkylsulfinyl, alkylsulfonyl, heterobicycyl, (hetero)tricycyl, CH_2Z , etc.; R4 = $(CH_2)_nZ$, $C_6H_4-(CH_2)_nZ$, etc.; R5 = H or (un)substituted alkyl; with provisos] were prepared. For example, cyclocondensation of the lithium salt of Et 2,4-dioxo-3-methyl-4-(4-bromophenyl)butanoate with 2,4-dichlorophenylhydrazine•HCl gave 1-(2,4-dichlorophenyl)-4-methyl-5-(4-bromophenyl)-1H-pyrazole-3-carboxylic acid Et ester. Bromination with N-bromosuccinimide, conversion to the alc. using $AgNO_3$ in aqueous acetone, amidation with 1-aminopiperidine in the presence of $AlCl_3$, and Suzuki coupling with di-Et (3-pyridyl)borane afforded II. I exhibited CB1 and CB2 cannabinoid receptor binding affinities with Ki values in the range of 1.51-85.1 and 5.81-2312, resp. Some invention compds. showed CB1 selectivity ranging from 2-452, while others showed CB2 selectivity ranging from 1-4. Thus, I are useful for the treatment of central nervous system disorders (no data).

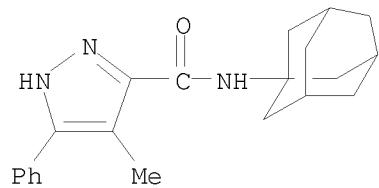
IT 501423-62-7P

RL: RCT (Reactant); SPN (Synthetic preparation); PREP (Preparation); RACT (Reactant or reagent)

(intermediate; preparation of pyrazolecarboxamides as cannabinoid receptor stimulators for treatment of CNS disorders)

RN 501423-62-7 CAPLUS

CN 1H-Pyrazole-3-carboxamide, 4-methyl-5-phenyl-N-tricyclo[3.3.1.13,7]dec-1-yl- (CA INDEX NAME)



REFERENCE COUNT:

1

THERE ARE 1 CITED REFERENCES AVAILABLE FOR THIS RECORD. ALL CITATIONS AVAILABLE IN THE RE FORMAT